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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/519,063	12/22/2004	Cornelis Antonie Maria	CA0669	7330
³⁶²⁴ VOLPE AND F	7590 05/25/201 ¹ KOENIG, P.C.	EXAMINER		
UNITED PLAZ	ZA, SUITE 1600		NGUYEN, LUONG TRUNG	
30 SOUTH 17TH STREET PHILADELPHIA, PA 19103			ART UNIT	PAPER NUMBER
			2622	
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

	Application No.	Applicant(s)	
	10/519,063	MARIA, CORNELIS ANTONIE	
Office Action Summary	Examiner	Art Unit	
	LUONG T. NGUYEN	2622	
The MAILING DATE of this communication appeariod for Reply	ppears on the cover sheet with the	e correspondence address	
A SHORTENED STATUTORY PERIOD FOR REP WHICHEVER IS LONGER, FROM THE MAILING - Extensions of time may be available under the provisions of 37 CFR 1 after SIX (6) MONTHS from the mailing date of this communication. - If NO period for reply is specified above, the maximum statutory perio Failure to reply within the set or extended period for reply will, by statu. Any reply received by the Office later than three months after the mail earned patent term adjustment. See 37 CFR 1.704(b).	DATE OF THIS COMMUNICATION 1.136(a). In no event, however, may a reply be d will apply and will expire SIX (6) MONTHS fruite, cause the application to become ABANDO	ON. e timely filed om the mailing date of this communication. NED (35 U.S.C. § 133).	
Status			
Responsive to communication(s) filed on 12 This action is FINAL. 2b) ☑ Th Since this application is in condition for allow closed in accordance with the practice under	nis action is non-final. vance except for formal matters, p		
Disposition of Claims			
4) ☐ Claim(s) 1,3 and 5-18 is/are pending in the a 4a) Of the above claim(s) is/are withdr 5) ☐ Claim(s) is/are allowed. 6) ☐ Claim(s) 1,3 and 5-18 is/are rejected. 7) ☐ Claim(s) is/are objected to. 8) ☐ Claim(s) are subject to restriction and	rawn from consideration.		
Application Papers			
9) The specification is objected to by the Examir 10) The drawing(s) filed on is/are: a) according a control of the drawing not request that any objection to the Replacement drawing sheet(s) including the correct of the control of the cont	ccepted or b) objected to by the drawing(s) be held in abeyance. Section is required if the drawing(s) is	See 37 CFR 1.85(a). objected to. See 37 CFR 1.121(d).	
Priority under 35 U.S.C. § 119			
a) All b) Some * c) None of: 1. Certified copies of the priority document of: 2. Certified copies of the priority document of: 3. Copies of the certified copies of the priority document of the priority document of the copies of the priority document of the certified copies of the certified co	nts have been received. nts have been received in Applic iority documents have been rece au (PCT Rule 17.2(a)).	ation No ived in this National Stage	
Attachment(s) 1) Notice of References Cited (PTO-892)	4) ☐ Interview Summa		
2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date	Paper No(s)/Mail 5) Notice of Informa 6) Other:	Date al Patent Application	

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DETAILED ACTION

1. The indication of allowable subject matter of claims 1, 3, 5-14, 16, as made on 11/13/2009, has been withdrawn due to the newly founded reference to Jaspers (US 7,573,515). Therefore, a replacement non-final office action sets forth below.

Claim Objections

2. Claims 1, 3, 5-18 are objected to because of the following informalities:

Since claim 1 (line 8) recites limitation "the reconstruction filter", the limitation "a filter" recited in claim 1 (line 3) should be changed to "a reconstruction filter".

Since claim 1 (line 7) recites limitation "the reconstruction filter", the limitation "the filter" recited in claim 1 (lines 3-4) should be changed to "the reconstruction filter".

Claim 1 (line 7), "the steps of;" should be changed to -- the steps of:--.

Claim 1 (line 10), "a red pixel" should be changed to --a red-pixel--.

Claim 1 (line 13), "the red- and/or" should be changed to --the red-pixel and/or--.

Claim 1 (lines 14, 16), "the array" should be changed to --the array of pixels--.

Claim 1 (line 15), claim 3 (line 3), "the green parameter" should be changed to --the green-parameter--.

Claim 1 (line 17), "the color-reconstruction filter" should be changed to
--a color-reconstruction-filter--. Noted that claim 13 (lines 1-2) recites limitation "the color-reconstruction-filter--.

Claim 5 (line 2), "the low-pass-filter" should be changed to --a low-pass-filter--.

Claim 6 (lines 2-3), "in particular has to array-size" should be changed to --in particular to an array-size--.

Claim 15 (line 9), "the construction-filter" should be changed to --the at least one construction-filter --.

Claim 15 (line 15), "the red- and/or" should be changed to --the red-pixel and/or--.

Claim 15 (lines 16, 17), "the array" should be changed to --the array of pixels--.

Claim 16 (line 2), "in particular a computing system" should be changed to --in particular to the computing system--.

Claims 1, 3, 5-14 are objected as being dependent from claim 1.

Appropriate correction is required.

Claim Rejections - 35 USC § 112

3. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

4. Claims 17, 18 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claim 17 (line 1) recites "A computing system," claim 17 (line 2) recites "a computing system," claim 17 (lines 4-5), recites "a computing system," claim 17 (line 5), recites "a computing system," claim 17 (line 6) recites limitation "the computing system," claim 17 (lines 7-8) recites limitation "the computing system," claim 17 (line 8) recites limitation "the

computing system;" the recitation this limitation in claim 17 causes confusion since it is not known that these limitations refer to only a single computing system or refer to another one.

Claim 17 (line 7) recites limitation "the computer program product," it is not known that this limitation refers to limitation "a computer program product" recited in claim 17 (line 3) or refers to limitation "a computer program product" recited in claim 17 (line 4).

Claim 18 (lines 5-6) recites limitation "the camera," it is not known that this limitation refers to limitation "a camera" recited in claim 18 (line 1) or refers to limitation "a camera" recited in claim 18 (line 3).

Claim 18 (lines 4, 5-6) recites limitation "the computer system," it is not known that this limitation refers to limitation "a computer system" recited in claim 18 (lines 2-3) or refers to limitation "a computer system" recited in claim 18 (line 3).

Claim Rejections - 35 USC § 101

5. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

6. Claims 16-18 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.

Claims 16-18, each of these claims recites "a computer program product storable on medium readable by a computing system..." After close inspection, the Examiner notes that the

disclosure, as a whole, does not specifically identify what may be included as a medium readable by a computing system and what is not to be included as a medium readable by a computing system.

The USPTO is obliged to give claims their broadest reasonable interpretation consistent with the specification during examination. The broadest reasonable interpretation of a claim drawn to a computer readable medium (also called machine readable medium and other such variations) typically covers forms of non-transitory tangible media and transitory propagating signals *per se* in view of the ordinary and customary meaning of computer readable media, particularly when the specification is silent. See MPEP 2111.01. When the broadest reasonable interpretation of a claim covers a signal, *per se*, the claim must be rejected under 35 U.S.C. § 101 as covering non-statutory subject matter.

Therefore, given the silence of the disclosure and the broadest reasonable interpretation, the medium readable of the claim may include transitory propagating signals. As a result, the claim pertains to non-statutory subject matter.

A claim drawn to such a computer readable medium that covers both transitory and non-transitory embodiments may be amended to narrow the claim to cover only statutory embodiments to avoid rejection under 35 U.S.C. § 101 by adding limitation "non-transitory" to the claim. Such an amendment would typically not raise new issue of the new matter, even when the specification is silent because the broadest reasonable interpretation relies on the ordinary and customary meaning that includes signals *per se*. For additional information, see the Patents' Official Gazette notice published February 23, 2010 (1351 OG 212).

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Double Patenting

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7. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. A nonstatutory obviousness-type double patenting rejection is appropriate where the conflicting claims are not identical, but at least one examined application claim is not patentably distinct from the reference claim(s) because the examined application claim is either anticipated by, or would have been obvious over, the reference claim(s). See, e.g., *In re Berg*, 140 F.3d 1428, 46 USPQ2d 1226 (Fed. Cir. 1998); *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) or 1.321(d) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent either is shown to be commonly owned with this application, or claims an invention made as a result of activities undertaken within the scope of a joint research agreement.

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

8. Claims 1, 3, 5-16 are rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1, 3, 8, 10-15 of U.S. Patent No. 7,573,515.

Although the conflicting claims are not identical, they are not patentably distinct from each other because of the reasons below.

Regarding Application claim 1, Patent claim 1 contains all the limitation of the claim 1 of the instant application, except Patent claim 1 omits limitation "applying the contour-reconstruction-filter in parallel with application of the color-reconstruction filter to the pixels." However, since application claim 1 and patent claim 1 is the same in scope, it would have been obvious to one of ordinary skill in the art to modify Patent's claim 1 with the additional limitations so to obtain application claim 1 as claimed.

Regarding Application claim 3, Patent claim 3 disclosed all the limitations of Application claim 3.

Regarding Application claim 5, Patent claim 8 disclosed all the limitations of Application claim 5.

Regarding Application claim 6, Patent claim 13 disclosed all the limitations of Application claim 6.

Regarding Application claim 7, Patent claim 11 disclosed all the limitations of Application claim 7.

Regarding Application claim 8, Patent claim 1 contains all the limitation of the claim 1 of the instant application, except Patent claim 1 omits limitation "applying the contour-reconstruction-filter, in parallel with the luminance-reconstruction filter and by adding their reconstructed signals thereafter," as claimed in application claim 8. However, since application claims 1, 8 and patent claim 1 is the same in scope, it would have been obvious to one of ordinary skill in the art to modify Patent's claim 1 with the additional limitations so to obtain application claim 8 as claimed.

Regarding Application claim 9, Patent claim 1 contains all the limitation of the claim 1 of the instant application, except Patent claim 1 omits limitation "applying the contour-

reconstruction-filter to an array-size, which exceeds the size of an array to which the color-reconstruction-filter is applied," as claimed in application claim 9. However, since application claims 1, 9 and patent claim 1 is the same in scope, it would have been obvious to one of ordinary skill in the art to modify Patent's claim 1 with the additional limitations so to obtain application claim 9 as claimed.

Regarding Application claim 10, Patent claim 13 disclosed all the limitations of Application claim 10.

Regarding Application claim 11, Patent claim 12 disclosed all the limitations of Application claim 11.

Regarding Application claim 12, Patent claim 13 disclosed all the limitations of Application claim 12.

Regarding Application claim 13, Patent claim 13 disclosed all the limitations of Application claim 13.

Regarding Application claim 14, Patent claim 1 contains all the limitation of the claim 1 of the instant application, except Patent claim 1 omits limitation "applying a 3.times.3-color-reconstruction-filter in combination with a 5.times.5 contour-reconstruction0filter, in particular by adding subsequently a color-reconstructed and a contour-reconstructed signal for further

processing," as claimed in application claim 14. However, since application claims 1, 8 and patent claim 1 is the same in scope, it would have been obvious to one of ordinary skill in the art to modify Patent's claim 1 with the additional limitations so to obtain application claim 14 as claimed.

Regarding Application claim 15, Patent claim 14 contains all the limitation of the claim 15 of the instant application, except Patent claim 14 omits limitation "parallel processing the contour-reconstruction-filter and the color-reconstruction filter." However, since application claim 15 and patent claim 14 is the same in scope, it would have been obvious to one of ordinary skill in the art to modify Patent's claim 14 with the additional limitations so to obtain application claim 15 as claimed.

Regarding Application claim 16, Patent claim 15 disclosed all the limitations of Application claim 16.

Further, if Applicant agrees that there exists an Obviousness type of Double Patenting between the instant application No. 10/519,063 and U.S. Patent No. 7,573,515 and since there exists a terminal disclaimer, which is filed on 01/07/2009, between the U.S. Patent Application No. 10/519,060 (now U.S. Patent No. 7,573,515) and U.S. Patent Application No. 10/519,058, the Examiner requests that the applicant provides a terminal disclaimer between the instant application No. 10/519,063 and U.S. Patent No. 7,573,515, and a terminal disclaimer between the instant application No. 10/519,063 and U.S. Patent Application No. 10/519,058.

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Conclusion

9. Any inquiry concerning this communication or earlier communications from the

examiner should be directed to LUONG T. NGUYEN whose telephone number is (571)272-

7315. The examiner can normally be reached on 7:30AM - 5:00PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's

supervisor, DAVID L. OMETZ can be reached on (571) 272-7593. The fax phone number for

the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent

Application Information Retrieval (PAIR) system. Status information for published applications

may be obtained from either Private PAIR or Public PAIR. Status information for unpublished

applications is available through Private PAIR only. For more information about the PAIR

system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR

system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would

like assistance from a USPTO Customer Service Representative or access to the automated

information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/David L. Ometz/

Supervisory Patent Examiner, Art Unit

2622

/L. T. N./

Primary Examiner, Art Unit 2622

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